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MSDS Information

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Section 1. CHEMICAL PRODUCT SECTION

Product Name: Tuner/Contact Cleaner

Product Number: 1622-10S

General Use:

Product Description:

MANUFACTURER: Tech Spray, Inc.
P.O. Box 949
Amarillo, TX 79105-0949
PHONE: 806/372-8523
FAX: 806/372-8750

For Chemical Emergency, Spill, Leak, Fire Exposure, or Accident Call CHEMTREC DAY OR NIGHT 1-800-424-9300.

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Section 2. COMPOSITION / INFORMATION ON INGREDIENTS

CHEMICAL	C.A.S. Number	Weight %
Isopropanol	67-63-0	8-12
Denatured Alcohol	64-17-5	18-25
2-Methyl-2-Propanol	75-65-0	<<1
Carbon Dioxide	124-38-9	1-4
Hexane Isomers Consisting of:		
n-Hexane	110-54-3	39-43
Methylcyclopentane	96-37-7	8-10
Methyl pentane	varies	12-18
Acetic Acid, Propyl Ester	109-60-4	< 3

OSHA HAZARDOUS COMPONENTS (29 CFR 1910.1200):

	Exposure Limits 8 Hours TWA (PPM)		
	OSHA PEL	ACGIH TLV	Supplier
Isopropanol	400	400	
Denatured Alcohol	1000	1000	
Carbon Dioxide	10,000		
2-Methyl-2-Propanol	100	100	
Acetic Acid, Propyl Ester	250	250	
n-Hexane	30	30	
Methylcycle pentane	NE	NE	
Methyl pentane	500	500	

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Section 3. HAZARD IDENTIFICATION

Emergency Overview:

Potential Health Effects:

INHALATION: Major route of exposure. Vapor is heavier than air and can cause suffocation by reducing the available oxygen for breathing. Breathing high concentrations of vapor may cause light-headedness, giddiness, shortness of breath, confusion, and may lead to narcosis, cardiac irregularities,

unconsciousness or even death.

EYES: Liquid can cause slight, temporary irritation with slight temporary corneal injury. Vapors can irritate eyes.

SKIN: Product may cause skin irritation. Repeated of prolonged contact may cause redness with burning, drying, and cracking of skin. This product may be absorbed through the skin.

INGESTION: This product is toxic by ingestion. Ingestion may cause irritation of the digestive tract. Signs of nervous system depression (e.g. drowsiness, dizziness, loss of coordination, and fatigue). Nausea and vomiting will most likely occur.

This product has not been classified as a carcinogen or a probable carcinogen by NTP, IARC, or OSHA.

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Section 4. FIRST AID MEASURES

Inhalation:

Move to fresh air in case of accidental inhalation of vapors. If victim has stopped breathing, give artificial respiration. Call for prompt medical attention.

Eye Contact:

Flush eyes with large amounts of water for 15 minutes or until irritation subsides. If irritation persists, get medical attention.

Skin Contact:

Remove contaminated clothing (including shoes) and wash before reuse. Flush with large amounts of water. Use soap if available. If irritation persists, seek medical attention.

Ingestion:

Do not induce vomiting unless directed by a physician. If conscious and alert, give two glasses of water. Seek medical attention immediately.

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Section 5. FIRE FIGHTING MEASURES

Flash Point & Method: -15 F, TCC Method

Flammable Limits: LEL: 2.0 UEL: 12.0

Autoignition Temperature:

Calculated Heat of Combustion 33.51 kj/g NFPA Level 3 Aerosol

GENERAL HAZARD:

Vapors from this product may travel or be moved by air currents and ignited by pilot lights, sparks, heaters, electrical equipment, static discharges or other ignition sources at locations distant from product handling point. Vapors may settle in low or confined areas, or travel a

long distance to an ingition source and flash back expolsively. This material may produce a floatig fire hazard in extreme fire conditions.

FIRE FIGHTING INSTRUCTIONS:
Fire fighters should wear self contained, positive-pressure breathing apparatus and avoid skin contact.

FIRE FIGHTING EQUIPMENT:
Water, foam, dry chemical, carbon dioxide.

HAZARDOUS COMBUSTION PRODUCTS:
Smoke, fumes and oxides of carbon.

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Section 6. ACCIDENTAL RELEASE MEASURES

LAND SPILL:
Ventilate area well and avoid breathing vapors. Pick up paper and place in sealed containers for disposal.

WATER SPILL:

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Section 7. HANDLING AND STORAGE

STORAGE TEMPERATURE: Ambient
STORAGE PRESSURE: Atmospheric

GENERAL:
Keep container closed when not in use. Store in cool, well ventilated place out of direct sunlight and away from incompatible materials. (See STABILITY AND REACTIVITY Section 10.) Follow all MSD Sheet and Label warnings even after container is emptied.

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Section 8. EXPOSURE CONTROL / PERSONAL PROTECTION

Engineering Controls:
(X) Local Exhaust ventilation acceptable.
( ) Mechanical ventilation recommended.
( ) Use explosion-proof ventilation equipment.
( ) Do not use in confined spaces without mechanical ventilation equipment.
See section 2 for component exposure guidelines.

Personal Protection:
RESPIRATOR:
If concentrations are over the exposure limit and are known, air purifying respirator with Organic Vapor Cartridges may be acceptable. Refer to cartridges for acceptable levels. If concentrations are over exposure limit and are unknown, use a supplied air respirator.

HAND PROTECTION:
(X) Gloves recommended

(X) Solvex ( ) Neoprene
(X) Butyl ( ) Buna
( ) Natural Latex ( ) Cotton/Jersey

EYE PROTECTION:
(X) Safety Glasses ( ) Chemical Goggles ( ) Full Face Shield

OTHER RECOMMENDATIONS:

( ) Rubber Boots ( ) Splash-proof chemical resistant suit/apron

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Section 9. PHYSICAL AND CHEMICAL PROPERTIES

Density	0.69	pH	NA
Boiling Point	80C / 176F	% Volatile	100
Freezing Point	NIF	% Solids	0
Vapor Density (Air=1)	2.1	Evaporation Rate (H2O=1)	NIF
Solubility in Water	32	Viscosity	N/A
Molecular Weight	N/A	Physical State	LIQUID
Non-Exempt VOC (g/l)	690	Odor	NIF

Appearance: Clear water-white liquid with alcoholic odor.

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Section 10. STABILITY AND REACTIVITY

GENERAL:
STABLE
INCOMPATIBLE MATERIALS AND CONDITIONS TO AVOID:
Contact with open flame, heat.
Reactive alkali metals, strong acids & bases.
HAZARDOUS DECOMPOSITION:
Combustion yields carbon oxides.

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Section 11. TOXICOLOGICAL INFORMATION

RESULTS OF COMPONENT TOXICITY TEST PERFORMED:
Information not available.
HUMAN EXPERIENCE:
Information not available.

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Section 12. ECOLOGICAL INFORMATION

FURTHER INFORMATION:
Information not available.

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Section 13. DISPOSAL CONSIDERATIONS

RCRA 40 CFR 261 Classification:

Federal, State, and Local laws governing disposal of materials can differ. Ensure proper disposal compliance with proper authorities before disposal.

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Section 14. TRANSPORTATION INFORMATION

U.S. DOT Information
Proper Shipping Name: CONSUMER COMMODITY ORM-D
Hazard Class: NA
Packaging Group: NA
UN Number: NA
Limitations: NA

IATA
Proper Shipping Name: CONSUMER COMMODITY ID8000
Hazard Class: 9
Packing Group: NA
UN Number: ID8000
Limitations: Domestic shipments only.
When shipping International please contact
Tech Spray shipping department. CARGO AIRCRAFT ONLY

IMO
Proper Shipping Name: AEROSOLS
Class: 2.1
UN Number: UN1950
Packaging Group: NA
EMS: 2-13
MFAG: 306-310
Marine Pollutant: NA
Canadian TDG: NA
IMDG Page: 2102

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Section 15. REGULATORY INFORMATION

UNITED STATES FEDERAL REGULATIONS:

MSDS complies with OSHAs Hazard Communication Rule, 29 CFR 1910.1200.

CERCLA/SUPERFUND, 40 CFR 117, 302:
--- None of the chemicals are Superfund hazards ---

SARA SUPERFUND AND REAUTHORIZATION ACT OF 1986
TITLE III Sections 302, 311, 312 and 313:
Section 302 - Extremely hazardous substances (40 CFR 355):
--- None of the chemicals are Section 302 hazards ---

Section 311/312 - Material Safety Data Sheet Requirements (40 CFR 370)
( ) By our hazard evaluation, this product is non-hazardous.
(X) By our hazard evaluation, this product is hazardous. It should be reported under the following EPA hazard.
(X) Immediate (acute) health hazard
( ) Delayed (chronic) chronic health hazard
( ) Sudden release of pressure hazard
( ) Reactive hazard

(x) Flammable

Section 313 - List of Toxic Chemicals (40 CFC 372)

This product contains the following chemicals (at levels of 1% or greater) which are found on the 313 list of Toxic Chemicals.

CHEMICAL	C.A.S. NUMBER	WEIGHT %

TOXIC SUBSTANCE CONTROL ACT (TSCA): All substances are TSCA Listed.

RESOURCE CONSERVATION AND RECOVERY ACT (RCRA 40 CFR 261) Subpart C & D:
Refer to Section 11. for RCRA classification.

FEDERAL WATER POLLUTION CONTROL ACT, CLEAN WATER ACT, 40 CFR 401.15 (FORMERLY SECTION 307), 40 CFR 116 (FORMERLY SECTION 311)

This product contains the following chemicals which are listed:

CHEMICAL	C.A.S. NUMBER	WEIGHT %

CLEAN AIR ACT: --- No Information ---

STATE REGULATIONS:

CALIFORNIA PROPOSITION 65:

This product contains the following ingredients which appear on the California proposition 65 list:

CHEMICAL	C.A.S. NUMBER	WEIGHT %
--- None of the chemicals are on the Proposition 65 list ---		

INTERNATIONAL REGULATIONS:

CANADA WHIMS: NIF

EUROPE EINECS NUMBERS:

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Section 16. OTHER INFORMATION

LABEL INFORMATION:

European risk and Safety Phrases: NIF

European Symbols Needed: NIF

Canadian WHIMS Symbols: NIF

NFPA HAZARD RATING:

(3) Fire (1) Health (0) Reactivity

REVISION DATES, SECTIONS, REVISED BY:

23-DEC-97, Updated Section 9,16, B. Riffel
10-APRIL-98, REVIEWED SECTION 14, R. PRICHARD
10-MAY-99, Updated Section 2, B. Riffel
25-MAR-02, Revised Section 16 NFPA Rating S. Cook

ABBREVIATIONS USED IN THIS DOCUMENT:

NE - Not Established, NA - Not Applicable, NIF - No Information Found

REFERENCES:

Code of Federal Regulations (CFR)

The Sigma-Aldrich Library of Regulatory and Safety Data

Chemical Guide and OSHA Hazard Communication Standard
Various Federal, State & Local Regulations

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